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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
09/679,456	10/04/2000	Stephen A. Rago	3728-109US	7545	
26161	7590 03/21/2005		EXAMINER		
FISH & RIC	HARDSON PC	GYORFI, THOMAS A			
225 FRANKLIN ST BOSTON, MA 02110			ART UNIT	PAPER NUMBER	
			2135		
			DATE MAIL ED: 02/21/2004	DATE MAIL ED: 02/21/2006	

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)				
	09/679,456	RAGO, STEPHEN A.				
Office Action Summary	Examiner	Art Unit				
•	Tom Gyorfi	2135				
The MAILING DATE of this communication ap						
Period for Reply						
A SHORTENED STATUTORY PERIOD FOR REPL THE MAILING DATE OF THIS COMMUNICATION - Extensions of time may be available under the provisions of 37 CFR 1. after SIX (6) MONTHS from the mailing date of this communication. - If the period for reply specified above is less than thirty (30) days, a replection of the period for reply is specified above, the maximum statutory period from the period for reply will, by statue and the period for reply will, by statue and patent term adjustment. See 37 CFR 1.704(b).	. 136(a). In no event, however, may a reply be tin ply within the statutory minimum of thirty (30) day of will apply and will expire SIX (6) MONTHS from te, cause the application to become ABANDONE	nely filed s will be considered timely. the mailing date of this communication. D (35 U.S.C. § 133).				
Status						
1) Responsive to communication(s) filed on 30 l	December 2004.					
· = · · · · · · · · · · · · · · · · · ·						
3) Since this application is in condition for allows						
closed in accordance with the practice under	closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.					
Disposition of Claims						
4) Claim(s) <u>1-3,6-9, and 16-27</u> is/are pending in	the application.					
4a) Of the above claim(s) is/are withdrawn from consideration.						
5) Claim(s) is/are allowed.						
6)⊠ Claim(s) <u>1-3.6-9 and 16-27</u> is/are rejected.						
7) Claim(s) is/are objected to.						
8) Claim(s) are subject to restriction and/	or election requirement.					
Application Papers						
9) The specification is objected to by the Examin	er.					
10) ☐ The drawing(s) filed on is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.						
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).						
11) The oath or declaration is objected to by the E	examiner. Note the attached Office	Action or form PTO-152.				
Priority under 35 U.S.C. § 119						
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).						
a) ☐ All b) ☐ Some * c) ☐ None of:						
1. Certified copies of the priority documer	nts have been received.					
2. Certified copies of the priority documer	nts have been received in Applicati	on No				
3. Copies of the certified copies of the price	ority documents have been receive	ed in this National Stage				
application from the International Burea	* **					
* See the attached detailed Office action for a lis	t of the certified copies not receive	ed.				
Attachment(s)						
1) Notice of References Cited (PTO-892) 4) Interview Summary (PTO-413)						
2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08	Paper No(s)/Mail Da	ate Patent Application (PTO-152)				
3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08 Paper No(s)/Mail Date	6) Other:	5.5 pp.106.101 (1 10-102)				

DETAILED ACTION

1. Claims 1-3, 6-9, and 16-27 are pending. The correspondence filed 12/30/04 amended claims 1, 16, 20, and 25.

Continued Examination Under 37 CFR 1.114

2. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 12/30/04 has been entered.

Claim Rejections - 35 USC § 103

- 3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 4. Claims 1-3, 6-9, and 16-27 are rejected under 35 U.S.C. 103(a) as obvious over Soltis et al. (U.S. Patent 6,493,804) in view of Applicant Admitted Prior Art (hereinafter "AAPA").

Referring to Claim 1:

Soltis discloses a method comprising the steps of: attaching said client to said file system (col. 8, lines 20-30; col. 10, lines 5-15); and reading a formal description of the file system by said client from said disc storage device, wherein the formal description of the file system enables said client to find and interpret at least one data structure comprising file information which enables the client to directly read and write data to and from said disc storage device without requiring further knowledge of said file system (col. 6, lines 10-15; col. 11, lines 50-60; col. 12, lines 10-15; col. 14, lines 55-60), block allocation for the data being performed by the server (col. 6, lines 30-60; col. 14, lines 40-55).

Although Soltis does not explicitly teach "wherein the formal description of the file system does not include a data structure comprising file information", Soltis does disclose that at least one embodiment of the invention can be implemented upon a Unix file system (col. 13, lines 30-63). Furthermore, AAPA discloses the existence of algorithms that are typically found in Unix file system drivers [the software that implements a Unix file system] that provide data structures that do not include file information (AAPA: Specification, page 11, lines 19-22). Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to use at least one of the algorithms disclosed by AAPA as part of the file system drivers inherent to Soltis. The motivation for doing so would be to re-use existing, debugged software technology as a stable base for building a new platform upon.

Referring to Claims 16, 20 and 25:

Soltis discloses a method for reading or writing data from a storage source comprising: acquiring a description of a file system associated with a storage resource from the storage resource, wherein the description of the file system enables a client to find and interpret at least one data structure comprising file information (col. 11, line 60-col. 12, lines 15; col. 14, lines 55-60); and finding and interpreting at least one data structure comprising file information for reading or writing directly to the storage resource based on the file information without requiring further knowledge of said file system (col. 6, lines 10-15) block allocation for the data being performed by the server (col. 6, lines 30-60, col. 14, lines 40-55).

Although Soltis does not explicitly teach "wherein the description of the file system does not include a data structure comprising file information", Soltis does disclose that at least one embodiment of the invention can be implemented upon a Unix file system (col. 13, lines 30-63). Furthermore, AAPA discloses the existence of algorithms that are typically found in Unix file system drivers [the software that implements a Unix file system] that provide data structures that do not include file information (AAPA: Specification, page 11, lines 19-22). Thus, it would have been obvious to one of ordinary skill in the art at the time the invention was made to use at least one of the algorithms disclosed by AAPA as part of the file system drivers inherent to Soltis. The motivation for doing so would be to re-use existing, debugged software technology as a stable base for building a new platform upon.

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Referring to Claim 2:

Soltis in view of AAPA disclose the limitations of Claim 1 above. Soltis further discloses reading enough information to find and interpret the physical block and offset containing a given file's inode given its inode number (col. 12, lines 40-45).

Referring to Claim 3:

Soltis in view of AAPA disclose the limitations of Claim 2 above. Soltis further discloses reading enough information to find and interpret the block list of a given file given an offset into the file and a length (col. 13, lines 15-30, 55-60).

Referring to Claim 6:

Soltis in view of AAPA disclose the limitations of Claim 3 above. Soltis further discloses sending a mount request; and receiving a mount response (col. 9, line 25-30)

Referring to Claim 7:

Soltis in view of AAPA disclose the limitations of Claim 6 above. Soltis further discloses said formal description of the file system read in step b. is saved for future use when a read request or a write request is made by said client (col. 9, line 45-50)

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Referring to Claim 8:

Soltis in view of AAPA disclose the limitations of Claim 7 above. Soltis further discloses said disc storage device is located in a Storage Area Network (SAN) (col. 8, lines 15-20).

Referring to Claim 9:

Soltis in view of AAPA disclose the limitations of Claim 7 above. Soltis further discloses client is located in said server (col. 10, lines 5-15).

Referring to Claims 17, 21 and 26:

Soltis in view of AAPA disclose the limitations of Claims 16, 20 and 25 above. Soltis further discloses reading or writing data blocks associated with the file system (col. 13, lines 15-30, 55-60).

Referring to Claims 22 and 27:

Soltis in view of AAPA disclose the limitations of Claims 20 and 25 above. Soltis further discloses a computer configured to read and write files associated with the file system (col. 13, lines 30-40).

Referring to Claims 18 and 23:

Soltis in view of AAPA disclose the limitations of Claims 16 and 22 above. Soltis further discloses finding and interpreting a block and an offset associated with a file on said file system based on a file identifier (col. 12, lines 40-45).

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Referring to Claims 19 and 24:

Soltis in view of AAPA disclose the limitations of Claims 18 and 22 above. Soltis further discloses finding and interpreting a block list associated with a file based on an offset into the file and a length (col. 13, lines 15-30, 55-60).

Conclusion

5. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure:

Source to ufs/ufs/ufs_bmap.c ©1993 Regents of the University of California and
Unix System Laboratories (see attached form PTO-892 for URL)

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tom Gyorfi whose telephone number is (571) 272-3849. The examiner can normally be reached on 8:00am - 4:30pm Monday - Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kim Vu can be reached on (571) 272-3859. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

TAG 3/8/05

> KIM VU JUPERVISORY PATENT EXAMINER TECHNOLOGY CENTER 2100